AMENDMENTS TO THE CLAIMS

The listing of claims will replace all prior versions, and listings, of claims in the application:

Listing of Claims

1. (Previously Presented)   A method in a cellular mobile telecommunication system for cell planning and preparing for a cell split when a cell tends to get congested or overloaded *characterised in* that position related data comprising the locations (x, y) for mobile users (MS) is registered together with what service is used by each user in terms of bit rate and wherein an estimation of the traffic density within the cell is created.

2. (Previously Presented)   The method of claim 1, wherein the path losses experienced on the radio channels (CH) of the mobiles (MS) are registered.

3. (Currently Amended)   The method of claim 1 [[or 2]], wherein an optimal site for a new base station is established based on the registered data.

4. (Original)   The method of claim 3 wherein maximising the following function gives the optimal site (x_{opt}, y_{opt}) for the new base station

$$x_{opt}, y_{opt} = max\ f(BR_n/PL_n, x_n, y_n)\ \textit{for all n}$$

where n an index number for the mobile users of the cell, BR_n is the bit rate used, PL_n is the path loss and x_n, y_n is the location of the user n.

5. (Original)   The method of claim 4, wherein a map is created showing the site of the new base station.

6. (Previously Presented)   A cell planning tool preparing for a cell split in a cellular telecommunication system comprising a control network (RNC/BSC) for registering the location (x, y) of mobile stations (MS) using the system *characterised in*

that means are included for registering the services used by the mobile stations and of further means for, based on the positioning and service data, estimating the traffic density of the cell.

7. (Original) The cell planning tool of claim 6, wherein the tool further comprises means for registering the path losses of the radio channels (CH) allocated to the mobile users.

8. (Currently Amended) The cell planning tool of claim 6 [[or 7]] wherein an optimal place (x_{opt}, y_{opt}) for a new site is established in a cell planning system node (CPS) of the tool.

9. (Original) The cell planning tool of claim 8, wherein the system node (CPS) establishes the optimal place (x_{opt}, y_{opt}) based on the maximum of the following expression

$$x_{opt}, y_{opt} = max\ f(BR_n/PL_n, x_n, y_n)\ for\ all\ n$$

where n an index number for the mobile users of the cell, BR is the bit rate used, PL is the path loss and x, y is the location of a user.

10. (Original) A cellular telecommunication system comprising base stations (BS) and mobile stations (MS) in communication with each other in a cell under supervision of a control network (RNC/BSC) *characterised by* a cell planning system node (CPS) which collects data from the telecommunication system relating to the location (x, y) of the mobile stations (MS), their path losses on their radio channels and the services they use, and wherein said node (CPS) comprises data collecting and calculation equipment, which predicts an optimal place (x_{opt}, y_{opt}) for a new base station when the cell otherwise will be overloaded.